

CLAIMS

What is claimed is:

1. A method comprising:
storing a configuration for a distributed environment in a central storage of the distributed environment; and
updating a portion of the configuration in the distributed environment.
2. The method of Claim 1 wherein updating comprises:
acquiring a lock for the portion of the configuration in a first node in the distributed environment;
modifying the portion of the configuration;
invalidating a representation of the portion of the configuration in the distributed environment; and
releasing the lock.
3. The method of Claim 2 wherein updating further comprises:
updating a database to reflect modifications of a portion of the configuration; and
blocking reads of the configuration during the updating.
4. The method of Claim 2 wherein updating further comprises:
notifying nodes in the distributed environment of the updated configuration data.
5. The method of Claim 2 wherein the lock is cluster wide.
6. The method of Claim 2 wherein updating further comprises:
writing changes to a shared database.
7. The method of Claim 2 wherein modifying comprises:
changing a configuration object in a branch of a tree structure.
8. The method of Claim 2 wherein invalidating comprises:
sending a cache invalidation event to another node in the cluster.

9. The method of Claim 2 wherein invalidating comprises:
sending a message to a plurality of Java 2 Enterprise Edition (J2EE) nodes.
10. The method of Claim 2 wherein updating further comprises:
notifying registered listeners that the configuration has been changed.
11. A system comprising:
a plurality of nodes each having a instance of a configuration manager to maintain consistent storage of a configuration across the nodes without passing configuration modifications between the nodes;
a locking server shared by the plurality of nodes to coordinate access to the configuration; and
a database management system to provide an interface with a shared relational database, the database to store the configuration.
12. The system of Claim 11 wherein the configuring manager comprises:
a configuration cache; and
a configuration handler.
13. The system of Claim 12 wherein the configuration manager further comprises:
a persistency handler.
14. The system of Claim 11 further comprising:
a configuration handler to permit access to and modification of the configuration.
15. The system of Claim 11 wherein the configuration comprises:
a plurality of persistent objects holding information about a Java 2 enterprise edition cluster.
16. The system of Claim 15 wherein some of the persistent objects are cacheable.

17. The system of Claim 11 wherein the configuration manager comprises:
a change event listener to notify registered components of configuration change events.
18. A computer readable storage media containing executable computer program instructions which when executed cause a digital processing system to perform a method comprising:
storing a configuration for a distributed environment in a central storage of the distributed environment; and
updating a portion of the configuration in the distributed environment.
19. The computer readable storage media of Claim 18 containing executable computer program instructions which when executed cause a digital processing system to perform the method wherein updating comprises:
acquiring a lock for the portion of the configuration in a first node in the distributed environment;
modifying the portion of the configuration;
invalidating a representation of the portion of the configuration in the distributed environment; and
releasing the lock.
20. The computer readable storage media of Claim 19 containing executable computer program instructions which when executed cause a digital processing system to perform the method wherein updating comprises:
updating a database to reflect modifications of a portion of the configuration; and
blocking reads of the configuration during the updating.
21. The computer readable storage media of Claim 19 containing executable computer program instructions which when executed cause a digital processing system to perform the method wherein updating comprises:
notifying node in the distributed environment of the current configuration data.

22. The computer readable storage media of Claim 19 containing executable computer program instructions which when executed cause a digital processing system to perform the method wherein updating further comprises:
- changing the configuration locally;
 - writing the changes to a shared database; and
 - committing the changes.
23. The computer readable storage media of Claim 19 containing executable computer program instructions which when executed cause a digital processing system to perform the method wherein invalidating comprises:
- sending a cache invalidation event to another node in the cluster.
24. The computer readable storage media of Claim 19 containing executable computer program instructions which when executed cause a digital processing system to perform the method wherein updating comprises:
- notifying registered listeners that the configuration has been changed.
25. A system comprising:
- means for maintaining consistent storage of configuration information in a distributed environment;
 - means for controlling access to the configuration information; and
 - means for interfacing with a relational database system to provide persistent storage of the configuration information.
26. The system of Claim 25 wherein the configuration information comprises:
- a plurality of persistent objects holding information about a Java 2 Enterprise Edition cluster.
27. The system of Claim 25 wherein the means for maintaining comprises:
- a configuration cache resident in each node of the distributed environment; and
 - a configuration handler resident in each node of the distributed environment.